```
MAR 1 3 2008
                          SEQUENCE LISTING
<110>
       THOM, Kyogo
<120>
       Tumor antigen
<130>
       3190-014
<140>
       10/062,257
<141>
       2002-02-01
<150> PCT/JP00/05220
<151>
       2000-08-03
<150>
       JP HEI11-222101
<151>
      1999-08-05
<160>
       46
      PatentIn version 3.5
<170>
       1
9
<210>
<211>
<212>
       PRT
<213>
      Homo sapiens
<400>
      1
Thr Phe Asp Tyr Leu Arg Ser Val Leu
<210>
      2
<211>
      10
<212>
       PRT
      Homo sapiens
<213>
<400>
     2
Asp Tyr Leu Arg Ser Val Leu Glu Asp Phe
                                     10
<210> 3
<211> 9
<210>
<212> PRT
<213>
      Homo sapiens
<400> 3
His Tyr Thr Asn Ala Ser Asp Gly Leu
<210> 4
<211> 9
<212> PRT
<213> Homo sapiens
<400> 4
```

Thr Phe Glu Tyr Leu Gln Ala Phe Leu 5

Page 1

```
<210> 5
<211>
<212> PRT
<213> Homo sapiens
<400>
      5
Thr Phe Glu Tyr Ile Gln Ser Phe Leu
<210> 6
<211> 9
<212> PRT
<213> Homo sapiens
<400> 6
Thr Phe Glu Tyr Leu Gln Ser Phe Leu
<210> 7
<211> 9
<212> PRT
<213> Homo sapiens
<400> 7
Thr Phe Asp Tyr Leu Gln Ser Val Leu
<210> 8
<211> 9
<212> PRT
<213> Homo sapiens
<400>
Thr Phe Glu Tyr Ile Gln Ser Val Leu 5
<210> 9
<211> 9
<212> PRT
<213> Homo sapiens
<400> 9
Thr Phe Glu Phe Leu Gln Ser Val Leu
<210> 10
<211> 13
<212> PRT
<213> Artificial Sequence
<220>
<223> Description of Artificial Sequence:Designed peptide base on amino
acid sequence of Src family tyrosine kinases, which peptide has
                                           Page 2
```

## an ability to generate HLA-A24 restricted cytotoxic T lymphocytes

```
<220>
 <221> UNSURE
 <222> (3)..(3)
 <223> Xaa can be Asp or Glu.
 <220>
 <221> UNSURE
 <222> (4)..(4)
 <223> Xaa can be Tyr or Phe.
 <220>
 <221> UNSURE
 <222> (5)..(5)
 <223> Xaa can be Leu or Ile.
 <220>
 <221> UNSURE
 <222> (6)..(6)
 <223> Xaa can be Arg or Gln.
 <220>
 <221> UNSURE
 <222> (7)..(7)
 <223> Xaa can be Ser or Ala.
 <220>
<221> UNSURE
 <222> (8)..(8)
<223> Xaa can be Val or Phe.
 <220>
 <221> UNSURE
 <222> (10)..(10)
 <223> Xaa can be Glu or Asp.
 <220>
 <221> UNSURE
 <222> (12)..(12)
 <223> Xaa can be Phe or Tyr.
 <220>
 <221>
       UNSURE
 <222>
       (13)..(13)
 <223>
       Xaa can be Phe or Tyr.
 <400> 10
 Thr Phe Xaa Xaa Xaa Xaa Xaa Leu Xaa Asp Xaa Xaa
                                      10
 <210>
        11
 <211>
 <212>
        PRT
 <213>
        Homo sapiens
 <400>
        11
 Leu Gln Asp Asn Leu Val Ile Ala Leu
```

```
<210> 12
<211>
      9
<212> PRT
<213> Homo sapiens
<400>
      12
Lys Leu Val Glu Arg Leu Gly Ala Ala
<210> 13
<211>
      10
<212> PRT
<213> Homo sapiens
<400> 13
Gln Leu Gln His Gln Arg Leu Val Arg Leu
<210> 14
<211>
      9
<212> PRT
<213>
      Homo sapiens
<400> 14
Lys Leu Leu Asp Met Ala Ala Gln Ile
<210> 15
<211>
      9
<212>
      PRT
<213>
      Homo sapiens
<400>
      15
Gln Ile Ala Glu Gly Met Ala Phe Ile
1
<210> 16
<211>
<212>
      PRT
<213> Homo sapiens
<400> 16
Asp Val Trp Ser Phe Gly Ile Leu Leu
<210> 17
<211>
<212>
      PRT
<213>
     Homo sapiens
<400>
      17
Ser Val Leu Glu Asp Phe Phe Thr Ala
```

```
<210>
       18
<211>
        10
<212>
       PRT
<213>
      Homo sapiens
<400>
       18
Asp Tyr Leu Arg Ser Val Leu Asp Asp Phe 1 10
                                         10
<210>
<211>
<212>
       19
10
       PRT
<213>
       Homo sapiens
       19
<400>
Arg Asn Gly Ser Glu Tyr Arg Asp Pro Leu
<210>
<211>
       20
       10
<212>
       PRT
<213>
       Homo sapiens
<400>
       20
Ser Tyr Glu Pro Ser His Asp Gly Asp Leu
                                         10
<210>
<211>
       21
<212>
       PRT
<213>
       Homo sapiens
<400> 21
Asn Phe Val Ala Lys Ala Asn Ser Leu 5
<210> 22
<211> 9
<212> PRT
<213>
      Homo sapiens
<400> 22
Ser Phe Ser Leu Ser Val Arg Asp Phe
<210>
      23
<211>
<212>
        PRT
<213>
       Homo sapiens
<400>
       23
```

5

1

```
Phe Tyr Ile Ser Pro Arg Ile Thr Phe
<210> 24
<211>
       10
<212>
       PRT
<213>
       Homo sapiens
<400> 24
Leu Tyr Ala Val Val Thr Gln Glu Pro Ile
<210>
      25
<211>
       9
<212>
       PRT
<213>
       Homo sapiens
<400>
       25
Glu Tyr Met Glu Asn Gly Ser Leu Val
<210> 26
<211>
<212>
       9
       PRT
<213>
       Homo sapiens
<400> 26
Ala Phe Ile Glu Glu Arg Asn Tyr Ile
1
<210>
<211>
       27
       10
<212>
       PRT
<213> Homo sapiens
<400> 27
Glu Tyr Thr Ala Arg Glu Gly Ala Lys Phe 1
<210> 28
<211> 9
<212> PRT
<213> Homo sapiens
<400> 28
Thr Asn Pro Glu Val Ile Gln Asn Leu
<210> 29
<211>
<212>
       PRT
<213> Homo sapiens
```

```
<400> 29
Asn Leu Asp Asn Gly Gly Phe Tyr Ile 5
<210>
       30
<211>
       9
<212>
        PRT
<213>
       Homo sapiens
<400>
       30
Leu Leu Ile Arg Asn Gly Ser Glu Val
<210> 31
<211> 9
<212>
       PRT
<213>
       Homo sapiens
<400>
      31
Arg Leu Ile Glu Asp Asn Glu Tyr Thr
1
<210> 32
<211> 9
<212> PRT
<213>
       Homo sapiens
<400>
       32
Arg Leu Val Arg Leu Tyr Ala Val Val
<210>
       33
<211> 9
<212> PRT
<213> Homo sapiens
<400> 33
Val Leu Glu Asp Phe Phe Thr Ala Thr
<210> 34
<211> 9
<212> PRT
<213> Homo sapiens
<400> 34
Ser Met Ser Pro Asp Ala Phe Leu Ala 5
<210> 35
<211> 9
```

```
<212>
       PRT
<213>
       Homo sapiens
<400> 35
Lys Gln Leu Gln His Gln Arg Leu Val
<210>
<211>
<212>
       36
9
      PRT
<213>
       Homo sapiens
<400>
       36
Phe Leu Ile Arg Glu Ser Glu Ser Thr
<210>
       37
<211> 10
<212>
      PRT
<213>
       Homo sapiens
<400>
       37
Arg Leu Leu Ile Arg Asn Gly Ser Glu Val
                                      10
<210>
       38
<211>
       10
<212>
       PRT
<213>
       Homo sapiens
<400>
       38
Gly Leu His Glu Leu Val Arg His Tyr Thr
                                      10
<210>
      39
10
<211>
<212>
      PRT
<213>
       Homo sapiens
<400>
       39
Lys Pro Trp Trp Glu Asp Glu Trp Glu Val
<210>
       40
<211>
      10
<212>
      PRT
<213>
       Homo sapiens
<400>
       40
Lys Ile Ala Asp Phe Gly Leu Ala Arg Leu
```

```
<210> 41
<211> 10
<212> PRT
<213>
       Homo sapiens
<400>
       41
Lys Leu Thr Thr Asn Lys Leu Leu Asp Met
<210> 42
<211>
       10
<212> PRT
<213>
       Homo sapiens
<400> 42
Phe Ile Pro Phe Asn Phe Val Ala Lys Ala
<210> 43
<211> 10
<212> PRT
<213> Homo sapiens
<400> 43
Arg Leu Gly Ala Ala Gln Phe Gly Glu Val
                                       10
<210> 44
<211> 9
<212> PRT
<213>
       Homo sapiens
<400>
       44
Glu Val Pro Arg Glu Thr Leu Lys Leu
<210> 45
<211> 10
<212> PRT
<213> Homo sapiens
<400> 45
Ile Val Arg Leu Asp Gly Lys Asp Arg Leu 10
<210> 46
<211>
<212> PRT
<213> Homo sapiens
<400> 46
Asp Tyr Leu Arg Ser Val
```